

Remarks

Status of the Application

Claims 14-20 were pending in the application at the time the Office Action was mailed. By this amendment, claims 14 and 16 have been amended, claim 20 has been canceled and new claim 21 has been added. Accordingly, claims 14-19 and 21, as amended, are currently before the examiner for consideration.

Objection to the Specification

The Office Action objected to the specification for not providing the current status of the parent application to which priority is claimed. The specification has herewith been amended to address this objection.

Claim 16 Objections

Claim 16 has herewith been amended to address these objections.

§112, ¶2 Rejections

Claims 14-19 were rejected as being indefinite for use of the phrase “elisabethatrience cyclase.” Claim 14, from which claims 15-19 depend, has herewith been amended to clarify what is meant by this phrase.

Claim 16 has herewith been amended to address the rejection under this section.

In view thereof, Applicants respectfully request reconsideration and

withdrawal of the instant rejection.

§112, ¶1 Rejections

Claims 14-19 were rejected as failing to meet the written description and enablement requirements of §112, ¶1. Claim 14, from which claims 15-19 depend, has herewith been amended to recite language which the examiner has indicated to be enabled.

In view thereof, Applicants respectfully request reconsideration and withdrawal of the instant rejection.

New Claim 21

New claim 21 is patentable over the prior art and meets all requirements set forth in 35 U.S.C. §112. The element “purified elisabethatriene cyclase” is defined in paragraph [0011] of the specification as follows:

A “purified elisabethatriene cyclase” is a purified protein isolatable from *P. elisabethae* that has the ability to cyclize GGPP. The phrase includes the purified native form of elisabethatriene cyclase isolatable from *P. elisabethae* and having an apparent molecular weight of about 47,000 Da and an isoelectric point of about 5.1. It also includes naturally occurring and non-naturally occurring proteins having a similar structure (e.g., sharing 65, 70, 75, 80, 85, 90, 95, 97, 98, 99% or more sequence identity) and enzymatic activity, e.g., allelic variants of a native elisabethatriene cyclase, mutants of a native elisabethatriene cyclase, and forms of the enzyme produced by recombinant DNA technology or chemical synthesis.

This definition is more than clear enough for the skilled artisan to determine how to avoid infringement of the claim. See *Morton Int'l, Inc. v.*

Cardinal Chem. Co., 5 F.3d 1464, 1470, 28 USPQ2d 1190, 1195 (Fed. Cir. 1993).

This definition also limits the element to those species sharing structural and functional similarities to the purified native form of elisabethatriene cyclase isolatable from *P. elisabethae*.

Regarding the “substrate capable of being cyclized by the purified elisabethatriene cyclase,” this element is also clearly described in the specification. Several examples of such substrates are described in the application. Based on these examples, a person skilled in this art would readily be able to determine whether a given chemical entity was capable of being cyclized by the purified elisabethatriene cyclase- e.g., by comparing structural features of the chemical entity with substrates described in the specification and/or by testing the ability of the chemical entity to be cyclized with the purified elisabethatriene cyclase according to the methods described in the specification.

Conclusion

Although the applicants do not necessarily agree with or acquiesce in any rejections or objections set forth in the Office Action, the claims and/or specification have herewith been amended for the sole purpose of expediting prosecution.

The currently pending claims are supported throughout the specification and are patentable over the prior art. No new matter has been added. This application is now in full condition for allowance. Accordingly, applicants

respectfully request allowance of the claims. This paper is accompanied by a 1 month retroactive petition for extension of time and the required fee. The Commissioner is hereby authorized to charge any underpayment or credit any overpayment of fees under 37 CFR 1.16 or 1.17 as required by this paper to Deposit Account 50-0951.

The examiner is cordially invited to call the undersigned if clarification is needed on any matter within this response, or if the examiner believes a telephone interview would expedite the prosecution of the subject application to completion.

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Respectfully submitted,
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